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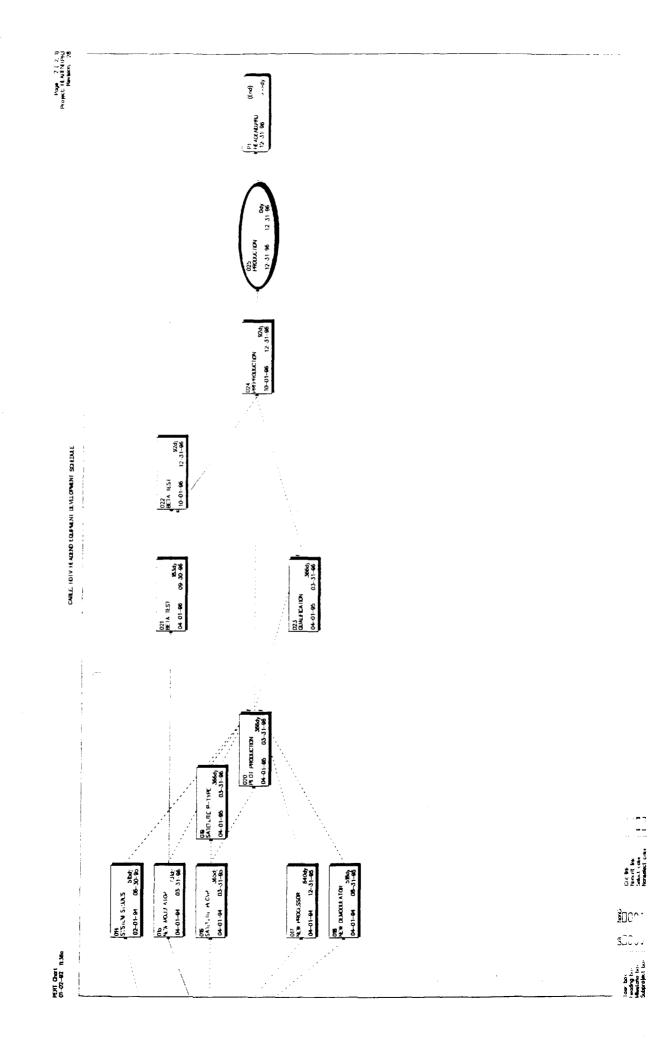
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Critical

Milestone

Tage by Committee by Committee



Project: HEADEND.PRJ Revision: 28

CABLE: HDTV HEADEND EQUIPMENT SCHEDULE

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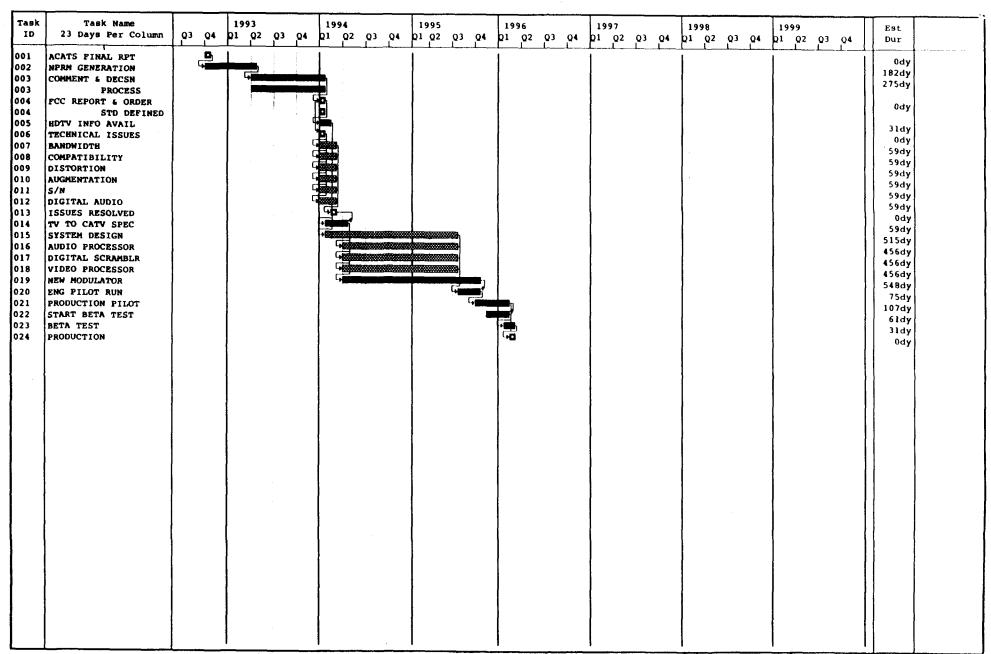
PERT Chart 01-02-62 4:3p

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Project: SCRAMBLE PRJ

Revision: 19

CABLE: HDTV SCRAMBLER DEVELOPMENT SCHEDULE



IS/WP-2 PERT Chart

Supporting List of Assumptions

Common Carrier: Video Distribution w/SONET at OC-12/24

General Assumptions

- 1. FCC Report & Order on Advanced Television Service is issued in the 1993 timeframe.
- 2. Requirements for 360 Mb/s and 1.2 Gb/s ATV transport will be satisfied by SONET OC-12 and OC-24 level services.
- 3. Sufficient demand for SONET OC-12 and OC-24 level services will materialize.
- 4. ATV Customer Premises Equipment and production equipment will be designed to operate/interface at the SONET rates as required.
- 5. Time frames associated with the vendor development of SONET equipment will coincide with normal product development time intervals.

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PERT Chart 01-02-82 3:15p

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Page 2 (2.1) Project TBCXXXVHJ Revision 0

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Project: TELCOSON.PRO Revision: 0

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IS/WP-2 PERT Chart

Supporting List of Assumptions

Satellite Distribution: Terminal Equipment Development

General Assumptions

- 1. Existing transponders adequate to carry ATV signals.
- 2. Only terminal equipment (encoders, exciters, receivers) requires replacement.
- 3. No resource limitations on IC development.

PERT Chart 01-02-82 3.36

SATELLITE DISTRIBUTION TERMINAL EGUPLENT DEVELOPLENT 100° FERT ONE! 01-02-62 34b

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IS/WP-2 PERT Chart

Supporting List of Assumptions

Consumer Products: TV Receiver Development/Production

General Assumptions

- 1. PERT chart is based on general market availability of HDTV product.
- 2. A Proponent may have a potential 9-month advantage if its system is selected.
- 3. No resource limitations on IC development.
- 4. High resolution displays will be available and are not included in this process.
- 5. ICs are ASICs and include both standard cell custom and gate array types.

Specific Assumptions

Task 2 - NPRM Generation

1. Sufficient public domain information will be available at the time of the NPRM to permit meaningful work.

Task 9 - Initial Emulator Development

1. IC emulators are required for the more complex ASICs.

Task 12 - IC Design Simulation

1. IC design simulations can begin three months prior to emulator completion.

Task 15 - IC Fabrication

1. IC fabrication will not begin until FCC final Report and Order has been released.

Tasks 18 & 19 - Design Stages I & II

IC development assumes one major (Task 18) and one minor (Task 19) iteration
of the layout.

PERT Chart 01-02-92 10.24o

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Project: CONSPROD.PRJ

Revision: 6

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Implementation Subcommittee Working Party 2 on Transition Scenarios

Preliminary List of Questions for Proponents

The following questions are for your consideration and response at the meeting of IS/WP-2 to be scheduled in March, 1992. They are divided into a general category and categories corresponding to the industry segments represented in the PERT and Gantt charts being supplied to you simultaneously with this list. The questions will be explained at the meeting of January 13, 1992.

General

- 1. Is extensibility built into your system? When can it be implemented? Under what prescribed conditions?
- 2. How long following an Advisory Committee recommendation of your system will the detailed technical information necessary for the setting of standards and for the design and manufacture of both professional and consumer products be available?
- 3. What provisions have you made for communicating information sufficient for design and manufacture to manufacturers of consumer and professional equipment? Do you have a program planned for providing direct support to help get such organizations up and running with your system?
- 4. What arrangements have you made with integrated circuit vendors for supplying chips for your system? What availability of ICs do you anticipate for other manufacturers?
- 5. What is your expectation for the time of introduction of your system? Do you have any suggestions for possible head starts in any areas to shorten the time to introduction?

Broadcast

1. What are the transmission power levels (ERP) required for the system for coverage equal to NTSC? Please specify for both low and high VHF and for UHF. Are there any power variations across the UHF band? Are any special transmitter or antenna characteristics required?

- 2. What signal form is anticipated for use in distribution to Network affiliates and/or to cable headends? Have you anticipated both satellite and terrestrial common carrier delivery? Have these been tested experimentally?
- 3. What forms of further production are possible using the signal delivered to affiliates and headends?
 - a) cut into the signal
 - b) key into the signal
 - c) full image manipulation
- 4. If the signal delivered to affiliates/headends must be fully decoded for further production, in the forms listed in 3 above, how many times can this be done with acceptable quality in the resulting picture? Have you tested this experimentally?
- 5. Is it possible to carry the ATV signals and NTSC signals together on a single microwave channel, as for Studio-to-Transmitter Links (STLs) and similar circuits? If so, what is the required bandwidth?
- 6. What signal form is anticipated for contribution circuits for production? Are different quality levels provided? Have you considered both satellite and terrestrial common carrier delivery? Assuming the production processes listed in 3 above, how many times through the signal form can an image go while retaining acceptable production quality in the resulting picture? Have you tested this experimentally?

Cable

- 1. What provisions are made for conditional access without decoding the signal? Is partial decoding required? How complex is the equipment required to accomplish these functions?
- 2. See questions 2, 3, 4, & 5 under Broadcast above.

Common Carrier

- 1. What form of signal do you propose for transmission over terrestrial common carrier links?
- 2. Are the SONET bit rates assumed the correct choices?
- 3. What bit error rates does your proposed distribution format require of the transport system? Your production contribution format?

Consumer

1. What is required in a consumer VCR for the system? When will such a VCR be available? Is new technology required first? What format is to be recorded? Are any current VCR features not possible with this format? Have you verified this experimentally?

Satellite

1. Is it possible to carry the ATV signal and an NTSC signal on the same transponder? If so, at what bandwidth? What other multiples are possible with your system?

FCC ADVISORY COMMITTEE ON ADVANCED TELEVISION SERVICE IMPLEMENTATION SUBCOMMITTEE WORKING PARTY 2 ON TRANSITION SCENARIOS (IS/WP-2)

January 13, 1992 10:00 am - 6:00 pm (Lunch included) 10:00 am - 3:00 pm - w/Proponents **Public Broadcasting Service** 6th Floor Board Room 1320 Braddock Place Alexandria, VA

AGENDA

1. Adoption of Agenda

2. Introduction (M. Weiss)

Presentation to Proponents

(20 min)

	IS/	WP-2	Business
10.	Follow Up/Summary	(30	min)
9.	Questions from Proponents	(30	min)
8.	Questions for Proponents	(30	min)
7.	Consumer Electronics Review (L. Cochran, C. Heuer)	(15	min)
6.	Satellite Review (L. Cochran)	(15	min)
5.	Common Carrier Review (P. Donovar	n) (15	min)
4.	Cable Review (R. Pience)	(30	min)
3.	Broadcast Review (M. Weiss)	(60	min)

- 11. Approval of 12/17/91 Minutes
- 12. Review of Action Items from 12/17/91 Meeting
- 13. Preparation of Fifth Interim Report
- 14. New Business
- 15. Conclusions & Action Items
- 16. Next Meeting